THE FARMER & GARDENER;

AND LIVE-STOCK BREEDER & MANAGER.

CONDUCTED BY I. IRVINE HITCHCOCK, AND ISSUED EVERY TUESDAY FROM THE AMERICAN FARMER ESTABLISHMENT, AT $5 PER ANNUM, IN ADVANCE.

No. 12. **BALTIMORE, JULY 22, 1834.** **Vol. I.**

☞ This publication is the *successor* of the late

AMERICAN FARMER,

(which is discontinued,) and is published at the same office, at five dollars per year, payable in advance.

☞ When this is done, 50 cents worth of any kind of seeds on hand will be delivered or sent to the order of the subscriber with his receipt.

American Farmer Establishment.

BALTIMORE: TUESDAY, JULY 22, 1834.

The object of "A Farmer"* appears to be a very feasable one, and we should be much pleased to see it carried into operation. The subject of Education is one of the first consequence to all classes, and in all occupations; but in none more needed than an education adapted to agricultural pursuits. We have our schools for Physic, Law, Divinity, and even War has been thought worthy of a separate endowment by legislative provisions, while Agriculture, on which all other professions and occupations depend, is left without fostering aid.

It has often been presented to our mind that school museums would be a most admirable mode of communicating intelligence to the young mind, on many subjects of the first importance, *now*, not thought of being embraced in our course of school education. How easy a matter it would be in this way, to present to every pupil in the country, specimens of every thing in Geology, Mineralogy and Botany, which our extended country contains; and being presented to the eye, and familiarized to the pupil from his youth, he would never be sensible of the labour of acquiring this information, which now falls only to the lot of a Wilson, a Nuttall, or an Audubon, and that, after years of toil and travel, at the hazard of their lives and the destruction of their bodily constitution.

How many articles are we ignorantly treading under our feet, for which our vessels are ransacking the four corners of the world, at the expense of much treasure and the destruction of many lives? We wish "A Farmer" success in his undertaking—we wish we had many more such farmers.

AGRICULTURAL REPORT.

The accounts which have reached us, generally report in favour of a good crop of wheat. In some few places it is said to have been injured by the wet weather where the ground was low and not well drained, but the grain is said to be well filled and heavy.

The prospect for the fall crop of corn is becoming more flattering—the dry hot weather is now very favorable for corn. If the ground has been well tilled and kept stirring and clear of weeds and grass, so as to make the roots strike deep into the ground, and, if these roots find there, any food to subsist upon, we may expect the country will be blessed with great abundance. The average wheat crop for all Frederick county is by late accounts laid at 20 to 22 bushels per acre. The agricultural reports from different parts of France are extremely favourable—the rains which succeeded the drought in the early part of the spring have made a very great improvement, and the vineyards and corn lands both promise a very abundant harvest.

It is to be remarked that at the time *we* had cold wet weather in the early part of the spring, *they* had the reverse in France.

WOOL.—We insert an extract from the Northampton Courier, addressed to their wool-growing friends—we know not of what value the information may be to that class of our friends—but as the season for active operations in that article is approaching, we insert the clause for their consideration. The demand has been very limited the last week, and prices have remained stationary. It is expected that more activity will soon take place in this business, when it will be for the holders of wool to consider the intelligence given by the Berkshire wool-grower, and to attach such weight to his communication as it may be deemed worthy of receiving.

"If our wool-growing friends have a fair price offered for the new clip, instead of unwisely holding on, expecting better ones, we would say by all means sell it. A letter from an experienced wool-grower in Berkshire, says that large quantities of foreign wool are in the market; a great amount of the domestic article has been forced off by men who wanted the avails; that many manufactories have stopped, and others have curtailed business; and that no good reasons now exist for believing that wool will rise in value, rather than diminish, this fall. The dissolution of Congress without doing any thing to settle the currency, or the political affairs of the country, is almost indubitable evidence of all this."

MARYLAND HORTICULTURAL SOCIETY.

Mr. I. I. Hitchcock presented specimens of the apple tomatoe.

Mr. Waters presented ripe fruit of the paradise apple.

Dr. Monkur presented ripe fruit of the paradise apple.

Mrs. Dr. Buckler exhibited a fine specimen of the agapanthus umbelatus.

Miss Eliza Schrœder exhibited a fine specimen of tigrida pavonia, and double pomegranite.

Mr. Samuel Feast exhibited a fine specimen of gloxinia alba; ixora coccinia, rosa microphylla, 8 species of heath; kitabelia vitifolia; two varieties of lilies, &c.

Mr. John Feast exhibited specimens of agapanthus umbelatus; lilium tigrinum; rudbeckia purpurea; ferraria tygrida, lagerstremia indica; lantana rosea; malva alba; silphiam perfoliatum; dahlias, lady grantham, Forster's constantia, and morning star, all very fine.

Mr. Edward Kurtz exhibited specimens of myrtus tomentosa, jasminum sambac pleno; phlox pyramidalis alba; plumbago capensis, &c.

LINNÆN BOTANIC GARDEN,
Flushing, July 12, 1834.

To the Editor of the Farmer & Gardener:

There is without doubt great room for improvement in objects of Agricultural interest, and parcularly in regard to grasses and grain. Even a transient glance at the agricultural publications of Europe will furnish convictive proof to the most incredulous on this subject. It is not the purpose of the present letter to enter into a detail of the species and their qualities, as those persons who desire to investigate them can consult Loudon's Encyclopedia of Agriculture, Sinclair on Grasses, and other publications of merit. The object of this letter is merely to state that we will import from Europe for all who desire them, the seeds of any grasses, grain, or other Agricultural, or Horticultural productions, and any orders for these articles ought to be transmitted to us speedily, so that there may be no disappointment. On receiving a list of the articles desired we will state the probable cost thereof.

Yours, respectfully,
WM. PRINCE & SONS.

A woman and two daughters died almost instantaneously in France, on drinking from a barrel of cider a year old, in which a dead serpent was found. The reptile had probably crept in the bunghole left open for the liquor to ferment.

NOT BAD.—"Have you any thing over today?" said a needy friend to a certain editor. "Yes," said he, "I have a note that lays over, and I will thank you to take it up."

* See page 91.

THE FARMER.

CULTIVATION OF THE PEROTTET MORUS MULTICAULIS.—In our former numbers we have given an account of the invention of machinery for manufacturing silk, which will give this branch of business a permanency in our country, and cause it to rival in importance that of wool, cotton, or any other manufactory in our country. We have likewise given a history of the introduction of the Perottet Morus Multicaulis into Europe, and into our country; and contrary to the doubts at first entertained of its being adapted to our climate, it is there shown that it will adapt itself to the extremes of heat and cold between the Senegal and the St. Lawrence. It is found to grow most luxuriantly in a light, sandy, rich and moist soil; and in such a situation, the leaves not unfrequently grow to the size of 12 by 15 inches. They are found to be of a very fine texture, and to afford more nutrition for the worm than an equal weight of leaves of the white mulberry. The size to which this tree will eventually arrive in this country, is not yet ascertained; but it is probable, it will not be found to grow large enough for an ornamental tree, for the purpose of shade.

Cultivation.—This tree may be cultivated from the seed; but it is not advisable to make use of that method, where the cuttings or layers can be obtained; as it will not reach from the seed, that size and perfection in four years, which will be attained in the second year, from cuttings or layers.

We have this tree growing on the experimental farm connected with the Farmer Establishment, in great luxuriance. The layers were put down in beds, on the 2d day of April last, and on the 21st day of May, being 48 days from the laying down the cuttings, the young shoots measured from 8 to 24 inches high, and some of the leaves were measured, being 6½ inches wide by 8 inches long. At that time the young plants were taken from the beds, and transplanted into the nursery, at about the distance of eighteen inches by two feet apart, where they will be permitted to stand until next November, or until the next spring, at which time they will be ready to be delivered to customers.

These plants, without further trouble than that of placing the layers in the beds, have thus in 48 days attained a state of forwardness and size, which the white mulberry, from the seed, would not have arrived at before the end of the second year, and at the expense of two year's cultivation. The seed of this tree has been produced, [illegible] in all expenses and changes of climate in one instance, in Baltimore, and in other places at the north, and in France. That renders it probable that when the trees have obtained greater age there will be no difficulty in procuring seed to be conveyed to a distance by mail, where no other opportunity of conveyance can be had without much difficulty; but in all other cases, there can be no doubt but the cuttings of the Multicaulis will be greatly to be preferred to the white mulberry, or to the seed of either kind.

The business of making silk will be advanced two years by making use of the layers of the Morus Multicaulis. The plants we now have on hand, if transplanted next November, to any place south of this, where the winter is mild, and the roots protected from the cold by throwing some litter round them, they will vegetate early in the spring, and the process of feeding the worms in numbers sufficient to obtain eggs for another year, may commence at once—whereas, with the white mulberry, it would not be advisable to begin pulling the leaves until the third or fourth year after sowing the seed. One reason why the feeding of the worm may commence so early with this tree is, that in a very short time the leaf arrives at a state of perfection, turns yellow, and if not pulled will drop off; and therefore, as soon as the leaf has arrived at a certain state of maturity, and other young shoots have been produced, the older leaves may be pulled without injury to the tree, and a succession of shoots are thus produced through the season that will enable the proprietor to continue the operation of feeding the worm through the greater part of the summer season. Though the leaves will grow in greater luxuriance in a moist and rich soil, yet we are by no means authorised to draw the conclusion that such will make silk of a better quality; nor are we certain that such luxuriance will be found to favor a greater production of silk to the acre. What grazier does not know that a ton of clover or spear-grass hay, where one half ton has been produced to the acre, is much more nutritious than that where three tons to the acre have been produced? This fact is perfectly familiar to the observing farmer, and in reasoning from analogy we may rationally draw the conclusion that like results will be produced in this case, and that moderately rich land will be found most propitious to the cultivation of good silk and of large crops.

When the plants are about to be placed in the field where they are finally to stand, various methods may be adopted, according to the views of the cultivator and the circumstances of the ground. We will consider what we conceive would be a proper mode of proceeding with one of the old cast off fields which so often mar the prospect in our country, and which have been no otherwise useful for half a century than to form a continuity of space.

The first thing to be done will be to enclose the ground with a good substantial fence, for without this precaution, the young trees will be kept down by all kinds of stock that can approach them. The extreme luxuriance of their growth, and the saccharine and nutritious quality of the leaf and young twigs, is peculiarly enticing to stock of all kinds, and it is very probable, that there could not be put into the ground an article, that would afford more nutritious food for animals. This will render it incumbent for the cultivator to be on his guard for the protection of his young trees. When the field is enclosed, if the soil be light and dry, let there be one bushel of plaster of paris sown to the acre, and the ground ploughed deep, say from 9 to 11 inches, and left flat; on the contrary, if the land be stiff clay, and wet, let it be thrown into ridges of from 12 to 16 feet wide, and a water furrow kept open for draining the land. Let the cultivator ever bear in mind, that this tree succeeds best in dry soil, and if his is not so by nature, it should be made so by art.

When the ground is thus prepared it will be for the cultivator to determine what plan he will pursue; and he will probably be influenced by the quantity of ground he intends to occupy for this object. If he is only trying a small experiment, he will be induced to plant out the standards closer together; if on the contrary his intention is, as we hope soon to see many so engaged, to make a mulberry plantation on their old commons, he will, in order to save present expense, place the young trees further apart, and suffer them to fill up the intervening space from young scions sent out from the roots—one tree to the square rod, or 16½ feet each way, would be a suitable distance in this case.

If the ground selected be the poor soil of which we have spoken, let a hole be dug of two and an half or three feet diameter, and 18 inches deep—fill the hole two thirds full of rich mould, or light manure—then place in the tree with the roots extended, fill up the remainder of the hole, and tread the dirt lightly round the roots.

It has been found in New Jersey, that marl is one of the best manures for trees—where this abounds, as it does on most of the tide waters of the Chesapeake, there can be no difficulty in cultivating this tree on the poorest soils. Leaves from the woods raked into heaps in the fall of the year,

soon after they have fallen from the trees, and covered with the earth taken from the surface of the soil, making alternate layers of leaves and of soil, and if a portion of shell marl were added, nothing would be better fitted for the young roots of this tree to shoot into, and produce young scions; which from year to year, may be thinned out, when too thick, and used to extend the plantation.

The interstices between the rows of trees should be cultivated, with some crop of low growth, such as potatoes, ruta baga, mangel wurtzel, &c. &c. and the ground manured, so as to take from the young mulberry orchard the expense of cultivation; the profits of the crop raised in this way would be sufficient to repay the expenses of cultivation, manure, &c.

(To be Continued.)

COUNTY MUSEUMS.

To the Editor of the Farmer & Gardener:

Specimens of nature and of art, collected in cabinets, or museums, in the towns and villages through our country, would evidently be sources of much instruction and much entertainment to nearly every class of the community. Representing, as they would, both the riches and the beauty of the mineral, vegetable and animal kingdoms, in one case as fresh from the hand of nature, and in another as modified by art, the philosopher could resort to them, as to rich fountains of instruction; the teacher also could lead his pupils there, to explain to them lessons they had conned over in their books. The farmer would find many things to encourage and strengthen his efforts in his laborious but honorable employment. He might discover some substance which he could add to his list of manures; some plant which would furnish to him a new object of attention, and an increased reward for his labors. He might see a specimen of some insect which he had before known only as a formidable enemy, and at the same place discover some weapon or mode by which he might destroy or avoid it.

The social circle also might resort to a cabinet of nature and of art; not indeed, at their first entrance, to have their eyes dazzled with rows of decanters sparkling with brandy or looking pale with gin or florid with wine, or to be presented with pitchers and tumblers as appropriate apparatus for trying experiments upon their power; but they might, on one shelf observe clusters of crystals as beautiful and as rich as the hand of nature could make them; on another they might examine the precious ones, which quickens the energy and perfects the skill of the mechanic in constructing the beautiful fabrics and multiplied luxuries with which he supplies our markets, and enriches our tables. They might also see specimens to show the power of the pencil and of the chisel, when directed by the hand of an accomplished artist. Circles of ladies and gentlemen, might, by resorting thither find a rich intellectual and social repast while there, and furnish themselves with materials for a continued entertainment for days and weeks after they had withdrawn.

To what more entertaining or useful resort could parents lead their children, than to a collection of specimens, which show how richly they are supplied with materials, both for sustenance, and instruction, exhibited in all the beautiful variety in which they are presented from the hand of their Creator.

Who is there, what man, woman or child can be found, who would not receive, both instruction and entertainment, by occasional resorts to museums of nature and of art?

As all will grant, and many feel, and feel sensibly, the importance of having cabinets, or museums, collected, not in one or a few places, but in all our towns, villages and neighborhoods, the interesting question is, how can they be provided? To answer that question, Mr. Editor, is the object of this communication, which is as follows:

1. On the first Wednesday of November next, let the friends of education and of general improvement in each of the eleven hundred counties in the U. States, meet at their county town, taking with them any specimens, either of nature or of art, which they may deem curious or useful.

2. Any person or persons at the meetings able and disposed to explain a part or the whole of the specimens presented, might do it for the benefit of all concerned, at the same time as far as practicable furnishing names and labels for the different kinds of specimens.

3. Such specimens as the owners wished to retain, would be for private use, after being exhibited, and perhaps named; the remainder deposited as the BEGINNERY of county museums.

4. Have forwarded to the Post Master of each county town, some plan for organization of county Lyceums, with provisions for quarterly meetings, to increase their collections, and to extend their operations. Provide also by some society or public spirited individuals, a sufficient number of Thomas S. Grimkie's address to S. Carolina, on the Lyceum system, to furnish each convention with a copy, to be sent to the Post Master as above.

5. Invite School Lyceums, some of which have already numerous collections, aided by other societies and individuals, to send to such places of county meetings as might be found practicable, such specimens, both of nature and of art, especially of their own improvement in penmanship, map drawing, needle-work, mechanism, &c. as they could spare for the use of said conventions and museums.

6. Let the Curators of each County Lyceum, forward to New York in time for the annual meeting of the National Lyceum, held on the first week of May, any specimens they might find practicable and expedient either for exhibition or for exchange and distribution through the union.

7. Let the plan already adopted by many School Lyceums in several of the states, of corresponding and exchanging specimens, greatly to their intellectual and *moral* improvement, be used as an example by schools generally throughout the union.

8. Let school committees and parents encourage and aid teachers and pupils, in attending the quarterly meetings of County Lyceums, and in forming societies and collecting specimens in their own neighborhoods and schools, and even in families, as examples of the last already exist in considerable numbers.

Note.—As all, or nearly all the steps above prepared, have already been taken in many counties, and in some of the smallest, it will be difficult perhaps to assign a reason why they may not be taken in each of the eleven hundred counties in our Republic. As the results of these steps, wherever and whenever taken, have been in the highest degree satisfactory and useful, it will be as difficult to assign a reason why they *should* not be taken, for the benefit both of individuals and of our nation; of the present and future generations.

A FARMER.

[From the Gardener's Magazine.]

ON THE MANAGEMENT OF THE VINERY.

In order to prevent the fruit from suffering from the effects of damp (an evil so often complained of in vineries,) the young wood should always be kept thin, by taking the tops from the shoots, three or four joints above the fruit; and not allowing them to ramble through the house, shading the fruit from the sun, and preventing the free circulation of air among the branches and berries. For the same reason, the lateral shoots, which push from the young wood, should be cut or pinched off at the first or second joint, so as not to endanger the bursting of the bud on the main shoot.

It is well known, that every place from which the sun and air are partially excluded is sure to be damp: the walls of a house, for instance, which are covered with ivy, if it is not in a very dry situation, will be found wet and uncomfortable in the inside.* When this is considered, it will appear evident, that upon the same principle, the vinery in which the wood is not properly thinned must suffer in the same manner, though in a less degree. Particular attention should be given to the thinning of the fruit; taking out most berries in the heart of the bunch; leaving those towards the extremities; and making the whole very thin. Those kinds of grapes the bunches of which are of a branchy nature, such as the black Hamburgh, the Syrian or white Nice, &c. should always be stretched out a little, and tied up with a small piece of matting, that they may have room to swell, and be kept from crowding each other. This is not only a means of preserving the bunches from damp, but also of having better swelled and finer-flavoured berries. It is a common practice with those who have fruit in their vineries, when the season is far advanced, to keep up the temper-

*Ivy, when not fully grown, may be liable to the objections of our correspondent; but when it has grown a sufficient time to clothe the face of a wall with its foliage, no covering whatever can more completely protect it from moisture. Our correspondent's objections apply with their full force to deciduous plants of every kind trained against the walls of houses; and both deciduous plants and evergreens afford protection and breeding-places for many kinds of insects, slugs, &c. We have known snails and earwigs infest bedrooms two and three stories from the ground, in houses, the walls of which were covered externally with ivy. For this reason, we would never have any description of plant, either deciduous or evergreen, trained on a cottage close to the windows. On walls wholly without windows, or architectural ornaments of any kind, ivy will form a valuable protection from rain, and also a non-conductor of heat, either from without or within.—*Cond.*

ature of the house, throughout the night, with artificial heat, and to let their fires go nearly out when the morning dawns. I do not, however, approve altogether of this plan.

Let any person go into a vinery in the morning, before it is aired, and when the sun is shining upon it, he will feel the atmosphere moist; and, on examining the fruit, will perceive that it is covered with dew. Now, if this moisture be allowed to remain for any length of time, it certainly must prove injurious; and to remedy the evil seems to be an object worth attention.

A very small degree of artificial heat will be found sufficient throughout the night; but, as soon as the sun arises in the morning, and shines upon the house, by increasing the temperature, and giving a sufficient quantity of air, the moisture will be expelled, and the atmosphere of the house will become dry. It may not be unnecessary to remark, that the fruit should be often examined; and if there are any of the berries on which the damp has taken effect, they should be carefully picked off; as, if they are suffered to remain, the damp will soon spread over the whole bunch. A GARDENER.

Mid-Lothian, Sept. 18, 1833.

HOW TO OCCUPY AN ACRE OF LAND.

Plant potatoes on one half and wheat on the other; the potatoe land is left in excellent condition for wheat the following year, reserving a small part for onions, cabbage, lettuce, &c. alternately. The produce on an average would be as follows: Between four and five coombs (of five bushels each) of wheat, with little for his pigs; holm (stubble) would furnish him with fuel to heat his oven; 150 bushels of potatoes besides other vegetables, which after using as many potatoes as may be wanted for his family, with his bran and a small quantity of corn, would fatten him three or four hogs in the year; and thus, as he would live more on animal food and vegetables, he would not consume half the quantity of flour, which constitutes nine-tenths of his subsistence. If he were to pursue this plan, the greater part of his crop would be consumed upon his land, which would continue to improve. His rent would be always ready, and he would be able to give more for his land than any farmer in the country. Take a view of him after his day's work; see him employed in his garden; his wife assisting; one of his children weeding, another employed in carrying the refuse to the pigs, a little one prattling beside the father, till the dusk of evening calls them to their repose. Rudely as I have drawn it, to me this picture seems delightful and all this might be effected to the benefit of the landlord, as well as that of the community at large.—*British Farmer's Magazine.*

AN OLD SAILOR.—The Salem (Mass.) Observer, speaks of a respectable ship master, now a resident in that town, who has spent at sea forty-four of the fifty-five years of his life. He has been in all climates, exposed to all examples, temptations and persuasions, on board of privateers, and in all situations incident to a sea-faring life, yet he has never, at any time, wet his lips with ardent spirits, or tasted so much as a glass of wine. His health has been perfect and unvarying, in all exposures and changes of climate.

THE BREEDER & MANAGER.

[From Dixon's Live Stock Manager.]

Milk.—This is another property which should not by any means be lost sight of by a breeding farmer, as it supplies in large proportions a product very useful to all families. The question of the propriety of having a distinct breed exclusively for this purpose, or only partly calculated for this use, and partly for that of the butcher, has not yet been fully decided; but if such cows as have much propensity to fatten, seldom answer the purpose of the dairy, it would seem that there ought to be a breed almost exclusively for the pail. It has, however, been suggested as probable, that by great attention, a breed might be reared, the males of which should in every respect, be well calculated for the shambles, and the females when young, produce abundant quantities of good milk; and when they reach a certain age, be easily fattened. Such a breed would, it is supposed, be of the greatest value of any that could be produced: and some of the best English and Scotch breeds, are believed to have nearly attained this point of perfection.

There can be no doubt, that those coarse, more open fleshed, ill-formed cows which have the least disposition to fatten, often give the largest quantities of milk; but the more fine fleshed, better formed sorts which are more particularly disposed to take on flesh, give that which is of a better quality and of a higher and richer flavor, at the same time they are more productive in other respects. They are, therefore, in some situations, and for some purposes, to be greatly preferred as consuming a much less quantity of food, and for other reasons.

It is by no means improbable that a cow-stock might be produced, which should unite the qualities of affording a large quantity of good milk, with a disposition to fatten in a ready manner. For this purpose, it would be necessary to select such young cows for breeding from, as have most of the marks of being well suited for fattening in the formation of their different parts; whilst at the same time a nice and exact attention should be paid in the selection, to the necessary properties of a good milker. The cows should possess peculiar favorableness of form and quality in the udder, and parts connected with it, such as a proper degree of roundness in the former, with considerable fulness or show in their fore-parts; and squareness in the standing of their teats, and a largeness and fulness of what are termed the milk veins. The young bulls to be selected for this purpose, should be such as have been raised from cows properly formed and disposed for fattening. By correctly attending to these and some other circumstances and points, in time a breed of most excellent feeding and milking cows would in all probability be raised; which would be of vast advantage to cow keepers of all kinds, as well as to the public in general; as from the present race of milk-cows wanting the form and disposition for fattening, there is a very great loss, especially to the milk dealers in the metropolis and other places, in parting with them, as well as a deficiency of meat for the supply of the public by their not becoming properly fat. The breeder should therefore be careful and attentive to direct his views more particularly to this matter than has hitherto been the case, as a great deal more is, perhaps, capable of being accomplished in this way, than has yet in general been attempted.

In the "Remarks on the Improvement of Cattle," the common notion of a great inclination for feeding being incompatible with good qualities for milking, is ably controverted. It is contended, that inclination and effect, are very different matters; that the former may exist, when the latter is, in the whole or part, overcome by some other counteracting cause; and that when the effect of such preventing cause can be removed, the original tendency may be fully effective. It is argued, "that if it were *assumed*, that a cow while giving a great quantity of milk could not possibly keep herself in good condition; because so great a portion of the food being converted into milk, the carcase could not be properly supported; still "it would be a rash conclusion, to infer from hence, that the same animal could not have a great tendency to get fat; and that when dried of her milk, this tendency might not soon produce its corresponding effect: for the effect of the milking quality having then ceased, the other cause, namely, the tendency to feeding, would remain unopposed in *its effects*, and be wholly operative." But such a position should never have been assumed, it is further argued, for, "as well might it have been contended by those who had only a bad race of hard-fleshed animals that there were therefore no other kind, that would produce a much greater quantity of beef from a given quantity of food."

But to proceed on the ground of fact and experience, it is observed, that "some animals have the power of obtaining a greater degree of nourishment from a given quantity of food, than others of an inferior description: and therefore, though some of the former may give a larger quantity of milk than the latter; yet their carcases also may, at the same time, be better supported." The author of the above-mentioned "*Remarks*" states, that he has "frequently found cows that are great milkers, to keep themselves at the same time in high condition, to feed with the quickest despatch when dried of their milk, and whose descendants will arrive at the earliest maturity: a practical proof, he observes, that a great tendency to feeding *is not* incompatible with a great tendency to milking;" and adds "that he has many such cows in his own possession."

After suspecting that this controversy had its origin, where only one property could be obtained, and that of early feeding being preferred to great milking, he remarks, "if both can be combined, and that they can," there is the conviction of experience; those breeds which possess only one of them, will not be thought of very highly. "For who, it is asked, that is conversant with such things, does not know the great difference between the value of the produce of two cows, the one a good, and the other a bad milker, if that produce be taken for one year only?"

When "the skill, the perseverance, and the capital required to improve a breed in the carcase only, is taken into consideration, it is not surprising that so few have attempted it;" and when it

is further considered, "that the union of great milking with quickness of feeding, required a two-fold labor, we might almost wonder it has been undertaken at all." Yet, whatever difficulties there may be in the business, they are to be overcome, by not neglecting any essential property that may be necessary to the animals that are bred. This was found perfectly practicable, "by selecting those animals that were the most perfect in point of form, in quality of flesh, and so on; and again, by selecting out of those the very best milkers," using in other respects the same care as already noticed. This mode of proceeding in the business is said to considerably increase "the expense in the first instance; but the advantages afterwards derived, are more than a sufficient compensation, as the property of milking is inherited as readily as that of peculiarity of shape."

In what regards "the value of different breeds as milkers only;" some have attended solely to the quantity of milk given by each cow, while others have had regard only to the quality. But it is certain that this value must depend on the quantity and quality jointly yielded from a given quantity of food. By the last of which "is to be understood, not merely the same weight; but the same weight of the same kind and quality also;" and in any trial it should further "be given under similar circumstances." The length of time set apart for any attempt of such a kind, too, should, it is conceived, "be at least a whole year: because some breeds will give a great quantity of milk just after calving, but will not yield that quantity for any considerable time, while others will not give so great a quantity at first, but approximate to it much longer." The number of cows need not be the same, "in two or more cases of trial; but the proper number for the consumption of the proposed quantity of food. For the question is not, whether the produce of so many of one breed, be more valuable than the produce of the same number of any other; but what will be the value of the produce, afforded by a certain quantity of food, when bestowed on the one, compared with the value of the produce afforded by the same quantity of the same kind of food when bestowed on any other; remaining circumstances being as similar as possible."

It is further noticed, too, that "in comparing the value of any breed with the value of any other, in reference to the shambles, it is very evident, that the placing out certain quantities of different kinds of feed, and comparing the increase of weight in each case with the quantity of food consumed, will never determine the question. because, here, it is said, the question is not, which have paid the best for a certain period; but which have paid the best during the whole course of their lives; the different breeds being killed at that particular age which will give them respectively the *maximum* of profit." It is, further, a circumstance well known to every practical man "that there is a certain age which is the most profitable for disposing of one kind; but another age and far different, the most profitable for disposing of another;" and that "some breeds cannot easily be made fat till they are three or four years old; while others are capable of being so at any age we may think proper." It is believed that "the most profitable age for disposing of fat cattle of the improved short-horned breed, is from two to three years old, according to circumstances at the time of sale." In all trials of this sort, it must be remembered, "there are many and great difficulties to encounter in order to render the comparison just; we may, however, proceed with a sufficient degree of accuracy, to determine what breeds are unquestionably the best; and the greater excellence has always been yielded to those which arrive at the earliest maturity."

Such are the conclusions of this very intelligent breeder on these various interesting points, and we recommend them as highly deserving the attention of those engaged in the breeding of animals, as their value rests on real practical grounds.

Aptitude for Labor.—This is a quality, that in certain circumstances, may be necessary to be considered in the breeding of Cattle Stock. "The question of the advantage that may be gained in this practice, in regard to the increase in the quantity of meat is, it has been observed, "far from having been decided; nor has it been well explained whether injury has not been done in restricting the growth of the animals by this means, more than can be compensated by their labor. It is obvious, however, that when cattle are worked they must be longer in being fitted for the market. But as, from the supposed greater cheapness of rearing and keeping neat cattle than horses, and from some other causes, it may sometimes be necessary to make use of cattle for the purpose of labor, a breed well calculated in this respect must be considerable in particular situations."

Such a breed is most probably to be met with in the fine, clean, active-formed varieties of the North Devon cattle, though some other sorts answer well for this purpose. Power, tractableness, activity, and speed, are the great requisite in stock for this use; for which cattle are usually begun to be trained from the age of two to three years, constantly working them in such a manner as not to injure their growth or value. But circumstances will be more fully considered and explained hereafter, in speaking of the ox, and other beasts of labor.

Blood, Lineage, or Descent.—These terms are used in the language of the art, and are adopted in analogy to the system of breeding in the race-horse, and, imply the quality of the breed, which is very necessary for the farmer praticularly to consider in the improvement of his live stock. The term, *blood*, is employed to signify the natural, fixed, and inherent properties of a breed, or kind, as exemplified in their external appearances. Its utility for the purposes of the breeder is, therefore, to enable him to discriminate, with greater nicety and correctness, in his selection of such animals, as are the most adapted to the improvements he has in contemplation.

The descent or lineage of animals is consequently a matter of the utmost importance in point of breeding, which is much better ascertained by the colour than the shapes of them. The same intelligent breeder, from whose remarks we have already selected so much valuable information, observes that, "suppose a number of pure Devon cows to be crossed with a breed of perfectly white bulls; in that case, it is thought probable, that some of the calves would be perfectly red, others white, and that the greater part would partake of these colours jointly. If we were then to take the red heifers produced by the cross, and put them to a Devon bull, it would not," he continues, "be a matter of any great surprise, if some of their progeny, though sprung from red parents, should be perfectly white, and still less, that several should be mixed with this color; though it would not by any means be so probable as in the former instance. And were we thus to proceed through several generations, this white colour would be less and less apparent in the breed, but would most probably occasionally show itself in some individual or other."

While, on the contrary, "were we to breed from pure devons only, that is, from those that have been carefully bred for a great length of time, we should reasonably expect their offspring to be of the same color with the parents themselves; while any deviation from this would be looked upon as one of those changes, which nature sometimes produces out of the common course of things. And what is thus stated is equally applicable," he remarks, "to peculiarity of form, or quantity of flesh."

In continuing the perfection attained by any breed, particular attention is necessary to this as well as other means; for it is observed, that "though animals that are themselves good, and have also been descended from a long race of valuable progenitors, are by no means likely to produce, even in a single instance, a bad offspring; yet it will be no more contended, that every animal produced by the same parents is precisely of the same value, than that the red colour in the Devon cattle is precisely of the same shade in each individual, or that the horns of the Lancashire are exactly of the same length." As "there is a *strong* tendency for *like to produce like*, both in the animal and vegetable kingdoms, so also there is a *slight* tendency to change; and nature *sometimes* deviating from her common course, produces an alteration which continues to be propagated. And hence will very clearly follow the impropriety of keeping a bad animal on pretence that it is well descended; an error which some breeders have, it is said, fallen into, if not in judgment, at least in practice." Hence too, "it will appear, that this defective kind of animal spoken of, is generally produced from some mixture of impure blood, or that the breed has been declining through several generations; in either of which cases, it can never be said to be well descended. For, in order that an animal may be well bred, it is not sufficient that we are able to trace it to parents the most perfect of their kind, but every intermediate gradation ought also to be good." It would appear, therefore, that in every material breeding point of view, no animal can be depended upon, unless well bred in all respects, and perfectly good in itself.

It is further observed, in respect to the improvement as well as the decline of breeds, that they are in general gradual, and proceed but slowly through several generations. And hence it is not at all inconsistent to say, 'that animals have

at length been produced very unlike their original stock:' and yet, at the same time, there is in nature a strong tendency for 'like to produce like.' But this remark, respecting the slowness of change, refers, it is said, to distinct breeds, and also where any particular family is not crossed with others that are much better or much worse of the same kind; but does not include adventitious circumstances, such as pasturage, climate, and some others. And it is on account of this slowness of procedure, it is said, that so many who have originally engaged in the improvement of stock, have been obliged to expend a considerable sum of money before they could obtain any material advantage; while those who have purchased from that stock, when improved, have reaped an immediate, and even a large, profit."

The success of the endeavors of the breeder, to whatever sort of excellence his attention may be directed, must obviously in a great measure depend upon the accuracy and correctness of his judgment in choosing those breeds, of whatever sort of live stock they may be, that are most adapted to his circumstances; and in selecting such individuals, both male and female, of such breeds as are the most perfect, and which excel in their different parts and properties; cautiously continuing to breed from them, without ever suffering the least intermixture by the admission of others of inferior qualities: advancing in this way with the nicest attention to such faults or defects, however trifling, as may arise, so as to alter and correct them by appropriate pairing in the succeeding generations. And as an indispensable assistant in this arduous undertaking, he must constantly have recourse to the aid of good and abundant keep at all seasons, with suitable degrees of shelter and warmth for both the old and young stock, so that they may never decline in flesh, or be checked in growth. Attention to these objects would seem to constitute the great secret of the important art of breeding live stock, which the superior discernment and unwearied perseverance of a single individual has raised to a degree of notice and perfection, that has had the happiest effects in bringing the improvement of our domestic animals to a state of excellence, unequalled in any other country.

All good stock, too, must be both bred with attention and be well fed; and it is necessary that these two essential points in this species of improvement should always accompany each other; for without good resources in keeping, it would be in vain to attempt supporting a capital stock, and with such resources it would be absurd to aim at a breed somewhat good in quality. However, as the circumstances of but few farmers admit of a total change, improvements of this nature can, in general, only be effected by degrees; for, though they may disapprove of what they have in possession, they may be able only to reject few of the inferior; but always for the future selecting the best for breeding and rearing, they will gradually render their stock more perfect. Undoubtedly, great improvements in cow-stock may be made, by proper selection of the best heifers in carcase and milk-bag for breeding stock, but more particularly by a judicious choice of the bull. Indeed, as prime, or first rate stock is in but few hands, and the owners generally ask higher prices than farmers in middling circumstances can afford to give, it would be highly advantageous, with this view, to have proper male stock provided by the proprietors of lands. In this way the letting of male stock in the midland and other districts has had much influence, and it is probably only by some encouragement of this nature that the highest improvement in this department can be attained. Much has, indeed, now been done in this way, in seconding the exertion and following the methods of the professed breeder, and in rendering improved stock better and more extensively known in most parts of the country; yet, as in general, trials will not be made in such matters, until the advantages of them are pretty well ascertained and understood, little can be done in many places where such improvements are scarcely begun, except by letting the common farmer have the use and benefit of such male stock at a tolerably easy rate. By these means much benefit would accrue, not only to the farmer, the professed breeder, and owners of such male stock, but to the country in general; while a fair degree of recompense may be reasonably looked forward to, by the promoter of such useful measures.

The above objects of the breeder will evidently be more or less readily and certainly effected, the more perfectly he is acquainted with, and capable of distinguishing between good and bad animals in the whole; and still further so, where he is able at once to see the most minute faults and imperfections, and to discover the various merits and perfections in them; as without these requisites he can never reach any great excellence in the art of raising or improving live stock.

Having thus discussed the principles, practices, properties, and other circumstances which seem most particularly to demand the attention of farmers and graziers, for the purposes of breeding and improving different sorts of live stock, we may now take a concise view of the nature and circumstances of the most remarkable breeds or kinds.

[From the London Lancet.]

Lectures on Veterinary Medicine,

Delivered in the University of London, by Mr. Youatt.

LECTURE III.

The Nasal Cavity in the Horse, the Ox, the Sheep, the Swine, and the Dog.—(Continued.)

Of the other bones, Gentlemen, which from the parietes of the nasal cavity, my description will be brief. Few points of practical importance can be connected with them, and I have too much to do in the present course to be delayed by that which does not immediately bear upon the functions of parts, or the nature of disease.

The Superior Maxillary.—In the horse, this bone forms by far the greater part of the lateral portion of the external parietes of the cavity of the nose, and the central portion of the floor of it; in fact, it constitutes more than three-fourths of the bony wall of the nasal cavity. The superior maxillary will be best described, when we consider the digestive system to which, as containing the teeth—the agents of mastication—it most properly belongs. I will now content myself with pointing out to you on its internal surface, the attachment of the inferior portion of the superior turbinated bone, along the suture connecting the superior maxillary with the nasal;—the curious depression, or gutter, hollowed out in the middle meatus of the nose, or the channel through which the secretions, natural or morbid, from the nasal cavity, and the maxillary sinuses, are discharged;—the prominent, but irregularly-formed ridge for the attachment of the inferior turbinated bone;—the more spacious hollow beneath, constituting the inferior meatus, or the principal or only air-passage;—the inferior portion of the bony canal which contains the anterior maxillary nerves, and also the inferior division of the bony portion of the lachrymal duct. You will likewise observe, that the palatine processes of this bone form the central and greater part of the floor of the nasal cavity and the roof of the palate; and that, denticulated with the suture that unites them, is the vomer, running along the whole of the floor, and supporting the cartilaginous septem by which the cavity is divided.

In Cattle the superior maxillary bones will be found like the nasals, and for the same reason, considerably smaller; but in addition to this, other bones encroach upon them, and particularly the palatine bone at the floor of the cavity. The other points of difference are, so far as the nasal cavity is concerned, the greater length and size of the canalis infra-orbitarius, and the thickness of the floor; not consisting of a single plate of bone, or with a very slight diploe, but hollowed out into numerous and deep cells, and being a continuation of the mixillary sinuses. In addition to this, we may remark the shortness of the nasal cavity compared with that of the horse resulting from the shortness of the superior maxillary bone.

In the Sheep, the superior maxillary is shortened almost as much as in the ox.

In the Swine it is diminished, by the intrusion of the anterior maxillary for the purpose of strength; and *in the dog*, while the bone is enlarged for the more extended and powerful insertion of the muscles of mastication, even so as to push the lachrymal bone from its place, the nasal surface is increased by the depth and projection of the bone, rather than by its length; while it is curtailed below, even more than in the ox and sheep, by the circular expansion of the palatine bones. The shortness of the bony canal of the anterior maxillary nerve, is very remarkable; the bulk and strength of the massater muscle seeming to require this earlier appearance and distribution and communication with the motor branches of the portio dura of the seventh pair.

The Anterior Maxillary Bones.—These are the *inter-maxillaries* of the comparative anatomist, locked between the superior maxillary bones, and also belonging to the digestive system.

In the horse, their posterior borders run along the anterior and upper edge of the superior maxillary, between which and the nasal bone, the extremities of it are inserted. They thus leave a large angular space, which is occupied by the soft parts that constitute the nostrils, and that are moveable, and can expand or dilate as the respiration or the breathing of the animal may require. These borders, narrow, rounded, and polished, afford attachment to important muscles presently to

be described. The inner surface of these processes forms an attachment for, and supports the lining membrane of, the nasal cavity anteriorly.

These bones, of which there is one on each side, uniting, form the rounded extremity of the upper jaw, in which the incisor teeth are inserted, and from the under, and palatine surface of which there proceed two long thin projections of bone, forming the anterior portion of the roof of the palate, and the floor of the nasal cavity.

In the Ox.—The anterior maxillaries of the ox, containing no incisor teeth, are small compared with those of the horse, and barely reach the nasal bones. There is generally a small portion of cartilage interposed between the extremity of the anterior borders of these bones, so that they seem to diverge from each other, forming a broad termination for the elastic pad or cushion which is the substitute for teeth here; and the palatine processes are longer and narrower, and leave a considerble space unoccupied, except by soft substance, in the roof of the palate and the floor of the nose.

In the Sheep.—These bones are similarly constructed as in the ox, except that the anterior extremities, constituting the base of the muzzle, are not comparatively so broad.

In the Swine, for the purposes of strength and digging to which I have alluded, the anterior border is somewhat sharpened, leaving but a small space for the nostril, and he wants not a more extensive one, for he is not an animal possessed of remarkable speed. The process of the anterior maxillary, received between the superior one and the nasal bones, is very much longer. In the horse it is not one-tenth part of the length of the nasal bone. In the hog it reaches two-thirds of the way up that bone. The attachment between these bones is likewise a complicated one, and all this to give strength to the part. The palatine processes here are more bony laminæ.

In the Dog, a beast of prey, strength is required in the anterior maxillaries; therefore the border is short, thick, and rounded; the opening of the nose is small, but round, instead of angular; the process between the superior maxillary, and the nasal is long, but not so wide as in the hog, and the connection between the bones is a denticulated and mortised one, and soon becomes obliterated. The palatine processes are wider than in the swine, but not so wide as in the sheep or the ox.

The Palatine Bones.—Constituting the crescentic, and posterior border of the palate and the nasal cavity, we find these bones. They are irregularly formed, and a perfect description of them would detain us for a length of time that we can ill spare. We first observe them at the termination of the palatine processes of the superior maxillary bones, as it were surrounding, but, in fact, locked in and supported by, these bones. They form, in all domesticated animals, a smooth round polished border at the point where the cavities of the mouth and the nose would terminate in one common passage leading on to the pharynx, and which border gives attachment to the velum palati, or soft palate, presently to be described, that partially or completely separates those cavities. If we trace this bone posteriorly in the *horse*, we find that it forms, on either side, the wall of the continuation of the nasal cavity from both nostrils, and which, now undivided, is called the ductus communis narium. It is separated from the mouth by the velum palati, and leads on towards the larynx. We here observe two processes on either side of this canal, one behind the last molar, and being the pterigoid process of the sphenoid bone, the other further back, and being a styloid, of sharpened process of the palatine bone, and having, in the recent subject, a beautiful cartilaginous hook or pulley, around which plays the tendon of the stylo-palatine muscle, or principal tensor of the velum palati. Externally we trace the connexion of this bone with the tuberosity of the superior maxillary; and, lying as it were between these two bones, that singular and important depression or hollow leading to the anterior and posterior palatine foramina, and the infra-orbital canal.

The principal difference in the construction of these bones in our other patients, consists in their relative bulk. In the *ruminant* the palatine bones occupy a far greater portion of the palate and the floor of the nose than they do in the horse. They particularly do so in the *ox*; and the walls of the ductus communis narium are considerably deeper. In the *hog* and the *dog*, the palatine bones throw an elliptical portion of no little development down the palate.—(*To be continued.*)

THE GARDENER.

An eighty feet Magnolia.—Those who are fond of flowers are advised to read the following article from Mobile, published in the New York Journal of Commerce: "This is the land of flowers, and moonlight evenings, and soft southern breezes. Here we have flowers in every variety from the little picaroon rose to the lofty and most magnificent magnolia. The magnolia is an evergreen, rising to the height of 80 feet, and often much more. The leaves are the deepest green, and so full that the branches are scarcely to be seen. Its blossom is of pure white, five or six inches in diameter, and of delicious fragrance.—This magnificent tree grows in great abundance in the woods adjoining Mobile, together with the titi, the cucumber tree, which is a species of magnolia, bearing still larger flowers, the accacia, and many others."

The Cereus Speciosissimus,

At Woodhall gardens, in Renfrewshire, attains an extraordinary size and beauty. The late excellent Mr. Henderson, gardener there, used soil composed of two parts of rich loam, three of decomposed manure, and one consisting of equal quantities of peat, sand, and broken tiles. The plant is placed in a large pot, and trained to the back trellis of a pine stove; where, in July, 1833, when I saw it, it occupied a surface of 84 square feet, and had 300 flowers all open at the same time. Mr. Denholm, the present gardener, gives this and other species of the Cactus family a more ample supply of water than is usually done, while they are maturing their flower-buds; and to this he attributes, in a great measure, the vigor of the bloom. In winter, when the plant is in a state of rest, little or no water is given.—*Juvenis. Glasgow, March 7, 1834.*

MISCELLANEOUS.

India Rubber Carpets.—Dr. Jones, of Mobile, in a letter to Prof. Silliman, says: "Having some India rubber varnish left which was prepared for another purpose, the thought occurred to me, of trying it as a covering for a carpet, after the following manner:—A piece of canvas was stretched and covered with a thin coat of glue, (corn meal size will probably answer best,) over this was laid a sheet of common brown paper, or newspaper, and another coat of glue added, over which was laid a pattern of house papering with rich figures. After the body of the carpet was thus prepared, a very thin touch of glue was carried over the face of the paper, to prevent the India rubber varnish from tarnishing the beautiful colors of the paper. After this was dried, one or two coats (as may be desired) of India rubber varnish were applied, which when dried formed a surface as smooth as polished glass, through which the variegated colors of the paper appeared with undiminished, if not with increased lustre. This carpet is quite durable, and is impenetrable to water or grease of any description. When soiled it may be washed, like a smooth piece of marble or wood. If gold or silver leaf forms the last coat instead of papering, and the varnish is then applied, nothing can exceed the splendid richness of the carpet, which gives the floor the appearance of being burnished with gold or silver. A neat carpet, on this plan, will cost, when made of good papering, about 37½ cents per yard."

Rail Roads in England.—There is now building in England what they term "the great Western Rail Road," which is to connect London and Bristol. Another is building between London and Southampton; another from London to Greenwich; another from London to Birmingham; another from Hull to Shelby; and the Northern Union Rail Road."

Golden Rule in Agriculture.—A practical husbandman, of the highest authority, assures us that the golden rule of agriculture—to use such manures as will make heavy land lighter, light land heavier, cold land hotter, and hot land colder—must never be lost sight of. He who knows and follows this rule, and he only, is a farmer.—*Central Courant.*

The total value of the manufacture of Iron, in the State of New York, is estimated at about $4,000,000 per annum.

CONTENTS OF THIS NUMBER.

BALTIMORE PRODUCE MARKET.

☞ *These Prices are carefully corrected every* MONDAY.

	PER.	FROM	TO
BRANDY, Apple,	gallon.	$0 27	$—
Peach,	"	75	—
BEANS, white field,	bushel.	2 00	—
BEEF, on the hoof,	100lbs.	5 50	6 25
CORN, yellow,	bushel.	65	66
White,	"	65	66
COTTON, Virginia,	pound.	10	13
North Carolina,	"	11	13
Upland,	"	11	14
FEATHERS,	pound.	—	37
FLAXSEED,	bushel.	1 00	1 25
FLOUR—Best white wheat family,	barrel.	6 50	7 00
Do. do. baker's	"	5 75	6 25
Do. do. Superfine,	"	5 00	5 25
Super Howard street,	"	5 12	5 25
" " wagon price,	"	5 00	—
City Mills, extra,	"	5 37	5 50
Do.	"	5 12	5 25
Susquehanna,	"	5 25	—
Rye,	"	3 37	—
GRASS SEEDS, red Clover,	bushel.	—	4 50
Timothy (herds of the north)	"	3 50	—
Orchard,	"	3 00	—
Tall meadow Oat,	"	2 50	—
Herds, or red top,	"	1 25	—
HAY, in bulk,	ton.	15 00	16 00
Pressed,	100 lbs	—	90
HEMP, country, dew rotted,	pound.	6	7
" water rotted,	"	7	8
LIME,	bushel.	30	35
MUSTARD SEED, Foreign,	"	4 50	5 00
Domestic,	"	5 00	—
OATS,	"	38	40
OIL, linseed,	gallon.	—	90
Castor	"	1 70	1 80
PEAS, red eye,	bushel.	—	—
Black eye,	"	— —	1 00
Lady,	"	—	—
PLASTER PARIS, in the stone,	ton.	3 00	—
Ground,	barrel.	1 37	—
PALMA CHRISTA BEAN,	bushel.	2 00	—
RAGS,	pound.	3	4
RYE,	bushel.	71	— —
TOBACCO, crop, common,	100 lbs	3 50	5 00
" brown and red,	"	4 00	6 00
" fine red,	"	6 00	8 00
" wrappery, suitable for segars,	"	6 00	12 00
" yellow and red,	"	8 00	12 00
" yellow,	"	13 00	17 00
" fine yellow,	"	15 00	22 00
Seconds, as in quality,	"	4 00	5 00
" ground leaf,	"	5 00	9 00
Virginia,	"	4 00	—
Rappahannock,	"	3 00	4 00
Kentucky,	"	4 00	8 00
WHEAT, white,	bushel.	1 20	—
Red,	"	1 08	1 12
WHISKEY, 1st pf. in bbls	gallon.	28	29
" in hhds	"	26	—
" wagon price,	"	—	—
WAGON FREIGHTS, to Pittsburgh,	100 lbs	1 00	—
To Wheeling,	"	1 25	—
		washed.	*unwash*
WOOL, Prime & Saxon Fleeces,	pound.	50 *to* 60	24 *to* 26
Full Merino,	"	40 50	20 24
Three fourths Merino,	"	33 40	22 24
One half do.	"	28 33	21 22
Common & one fourth Meri.	"	25 28	18 20
Pulled,	"	28 31	18 20

WOOL.

LYMAN REED & CO. Commission Merchants, No. 6 S. Charles street, Baltimore, Md.—devote particular attention to the sale of WOOL. All consignments made them will receive their particular attention, and liberal advances will be made when required. May 9.

SUBSCRIBERS can have their volumes of the AMERICAN FARMER neatly half bound and lettered at this establishment, at 75 cents a volume. Most of the Nos. can also be had at 10 cents each, to complete files.

BALTIMORE PROVISION MARKET.

	PER.	FROM.	TO.
APPLES,	peck.	$0 25	$0 37
BACON, hams,	pound.	10	—
Shoulders,	"	—	9
Middlings,	"	—	9
BUTTER, printed, in lbs. & half lbs.	"	25	—
Roll,	"	11	18
CIDER,	barrel.	—	—
CALVES, three to six weeks old	each.	4 00	8 00
COWS, new milch,	"	15 00	27 00
Dry,	"	9 00	12 00
CORN MEAL, for family use,	100lbs.	1 45	1 50
CHOP RYE,	"	1 56	1 62
EGGS,	dozen.	13	—
FISH, Shad, trimmed		—	—
" salted,	barrel.	6 37	—
Herrings, salted, No. 1 & 2,	"	3 87	4 00
Mackerel, No. 1, 2 & 3,	"	3 50	6 25
Cod, salted,	cwt.	2 75	3 00
LAMBS, alive,	each.	1 50	2 00
Slaughtered,	quart'r	31	50
LARD,	pound.	8	—
ONIONS,	bushel.	—	87
POULTRY, Fowls,	dozen.	—	—
Chickens,	"	2 25	2 50
Ducks,	"	—	3 00
POTATOES, Irish,	bushel.	—	62
New,	peck.	12	25
VEAL, fore quarters,	pound.	6	—
Hind do.	"	8	—

ADVERTISEMENTS.

LARGE WHITE FLAT TURNIP SEED, &c.
JUST RECEIVED,

550 LBS. large White Flat, and Red Top TURNIP SEED, (growth 1834,) raised at the Clairmount Nurseries, by R. S. Senr. from the finest and best shaped roots.—The perfect success of Turnip crops produced from this seed for the last eight years, and the general satisfaction expressed by those who have tried it, added to the increased annual demand for the article from Eastern Seedsmen and others, is sufficient proof of its superior quality.

It is recommended "to sow the seed about the 10th August, on new cleared land, or well tilled clay or loam—quantity of seed required to crop one acre of ground ¾ to 1¼ lb.; if the latter quantity is sown it will be necessary to cross the plants with a harrow, after which follow with hoes, leaving the plants about 12 inches apart." For further information relative to preparation of seed, cultivation, &c. see R. Sinclair's remarks on Turnip crops in the American Farmer, volume 8, page 138. Price $1 per lb. and a liberal discount to those who purchase to sell again.

Also, early round Dutch Turnip Seed, Norfolk or large white, white Tankard, yellow Bullock, Ruta Baga, and Dale's new Hybrid Turnip Seeds, at 75 cts. to $2 per lb.

Pickling Cucumber Seed of best sorts, Endive, Brussels Sprouts. Lettuce of various sorts, among which are brown Dutch; large white Cabbage and Cilicia—the three most esteemed sorts; Hybrid or Yellow Turnip Radish, and blue curled Greens, a superior sort for fall sowing, raised from selected plants.

500 lbs. prime early Cabbage Seed, (growth 1834) raised near London, consisting principally of early and large York, early George, Bullock's heart, Battersea and Sugar loaf. The vegetative qualities of those seeds have been fully tested in hot beds prepared for the purpose, and to insure certain success and prevent disappointment to those who purchase, plants of each of the above have been transplanted, and are now flourishing, which will enable a true description to be given of their quality, appearance, &c. before the 1st of September, which is the usual time of sowing.

R. SINCLAIR, Jr. at
SINCLAIR & MOORE'S
July 22. Maryland Agricultural Repository.

CUBA TOBACCO SEED.

JUST received from Matanzas, a few ounces of the true Cuba Tobacco Seed, from *la Vuelta Abajo*, warranted in prime order—Price $1.00 per ounce.

I. I. HITCHCOCK.

GAMA GRASS SEED.

A SMALL quantity just received, and for sale at 50 cents per ounce, by

I. I. HITCHCOCK.

IMPROVED DURHAM SHORT HORN BULLS—CHEAP.

I AM requested by a gentleman of high character as an agriculturist, in a neighboring state, to offer for sale several Bulls of his, of which he has yet given me no other description than the following, viz: "My stock is of the Short Horn Durham breed, and derived from the best and purest sources, imported recently." He offers Bulls two years old, one year old, and of the last spring, at the following prices respectively: $200, $150, $100.—If, as I presume from the character of the gentleman, his stock is of a high order, and if he can, as I also presume, furnish pedigrees of pure blood, then is the present a rare opportunity to procure fine Bulls, at more moderate prices than I have hitherto been able to offer them. I will ascertain further particulars in regard to this stock, and be able shortly to speak definitely as to its character. In the mean time, should any gentleman want one or more of these Bulls, he may rely entirely on receiving through this Establishment no other than such as shall be represented and proved too.

Address I. I. HITCHCOCK,
July 15. American Farmer Establishment.

NEW LEICESTER BUCKS.

I AM authorised to sell several fine Bucks of the Leicester or improved Bakewell breed of Sheep, at from $75 to $100 each. Who will have one or more!—

I. I. HITCHCOCK,
July 15. American Farmer Establishment.

DALE'S NEW HYBRID TURNIP.

THE subscriber now offers to the agriculturists a new and decidedly superior variety of Turnip, originated by R. Dale, esq. an intelligent farmer, near Edinburgh, Scotland; it was obtained by unwearied attention in crossing the Swedish or Ruta Baga Turnip; it is superior in size and flavor to the Ruta Baga; is closer and finer in the texture; it is rapid in its growth as the White Flat Turnip. In fact, it includes the great desideratum in the selection of a proper variety of the Turnip which is to obtain the greatest possible weight at a given expense of manure. This variety seems to be more adapted to this end than any other sort introduced; it will be found superior in quality to any of the White Field Turnips, and keeps longer than any of them, and very near as long as the Ruta Baga—the color is yellow—the shape oblong. Price 25 cents per ounce. The season for sowing is at hand.

I. I. HITCHCOCK
10 June Amer. Farm. Estab.

THE 7-8 SHORT HORN DURHAM BULL "DUKE" IS FOR SALE.

DUKE is 2 years old, red and white, by Parson, dam Isabella; Parson is by Bishop, dam, Moss Rose, (imported in 1821, bred by Mr. Ashcroft,) got by Phenomenon—Isabella is by the celebrated imported bull Lothario, dam, Meg, by Billy Austin. Duke is of uncommon fine size and figure, pronounced by judges to have every point and appearance of a full bred. Price (to suit the times) $150.

Also—Several 3-4 blood HEIFERS, with their first calves, will be disposed of at $100 each. Application to be made (post paid) to I. I. HITCHCOCK,
May 30 American Farmer Establishment.

GRAY OR GAZE HOUNDS.

LAST September, I received from the President of the United States, for the breeding farm of this Establishment, a pair of these very beautiful and powerful animals, which had been sent out to him from Holland, by the American Consul there, and in vol. 15, of the American Farmer, page 233, I published the letter accompanying the very acceptable present. I have now the satisfaction to offer for sale four (female) puppies—their issue. They will be ready for delivery in all the month of July. Price $20 each.

I. I. HITCHCOCK,
American Farmer Establishment.

TURNIP SPINACH & CABBAGE SEED.

A FULL supply of these seeds of several of the best varieties for summer and fall sowing, now on hand and for sale by I. I. HITCHCOCK,
july 1 Amer. Farm. Estab.

UNDERGROUND TURNIP.

THIS turnip is represented as able to resist frost in an extraordinary degree. (See description of it in the first page of this No.) For sale at the American Farmer Establishment. Price $1 per pound. jy 8